

<b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b> Modified PTO Form 1449	Docket Number <b>11746/46004</b>	Serial No. <b>10/053,520</b>
	Inventor(s) <b>ROTHMAN et al.</b>	
	Filing Date <b>January 17, 2002</b>	Group <b>1646</b>

**U. S. PATENT DOCUMENTS**

EXAMINER INITIAL	PATENT NUMBER	PATENT DATE	NAME	CLASS	SUBCLASS	FILING DATE*
<i>Mr.</i>	6,048,530	4/11/00	Srivastava			
	6,030,618	2/29/00	Srivastava			
	6,017,540	1/25/00	Srivastava et al.			
	5,961,979	10/5/99	Srivastava			
	5,997,873	12/7/99	Srivastava			
	5,985,270	11/16/99	Srivastava			
	5,935,576	8/10/99	Srivastava			
	5,837,251	11/17/98	Srivastava			
	5,750,119	5/12/98	Srivastava			
	5,541,109	6/30/96	Searfoss			
	5,348,945	9/20/94	Berberian et al.			

\* - If pertinent

**FOREIGN PATENT DOCUMENTS**

EXAMINER INITIAL	DOCUMENT NUMBER	DATE	COUNTRY	CLASS	SUBCLASS	TRANSLATION YES NO
	WO 98/35705	8/20/98	PCT			N/A
	WO 98/23735	6/4/98	PCT			N/A
	WO 97/26910	7/31/97	PCT			N/A
	WO 97/10000	3/20/97	PCT			N/A
	WO 97/10001	3/20/97	PCT			N/A
	WO 97/10002	3/20/97	PCT			N/A
	WO 97/06685	2/27/97	PCT			N/A
	WO 97/06281	2/27/97	PCT			N/A
	WO 96/10411	4/11/96	PCT			N/A
	WO 95/24923	9/21/95	PCT			N/A
	WO 94/29459	12/22/94	PCT			N/A
	WO 94/11513	5/26/94	PCT			N/A

EXAMINER INITIAL	DOCUMENT NUMBER	DATE	COUNTRY	CLASS	SUBCLASS	TRANSLATION YES NO	
	WO 93/17712	9/16/93	PCT			N/A	
	WO 89/04871	6/1/89	PCT			N/A	
	0 538 952	4/28/93	Europe			N/A	

#### OTHER DOCUMENTS

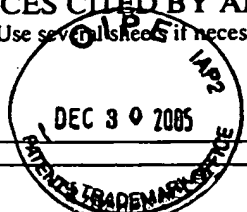
EXAMINER INITIAL	AUTHOR, TITLE, DATE, PERTINENT PAGES, ETC.
	Galigniana et al., 1998, Mol. Endo. 12:1903-1913.
	Czar et al., 1997, Biochemistry 36:7776-7785.
	Blachere et al., 1997, J. Exp. Med. 186:1315-1322.
	Tamura et al., 1997, Science 278:117-120.
	Wearsch et al., 1997, J. Biol. Chem. 272:5152-5156.
	Tavaria et al., 1996, Cell Stress and Chaperones 1:23-28.
	Jakob et al., 1996, J. Biol. Chem. 271:10035-10041.
	Rosenberg et al., December 1996, in Novations (newsletter of Novagen, Inc.) No. 6, pp. 1-6
	Auger et al., 1996, Nature Medicine 2:306-310.
	Giboa, 1996, Seminars in Oncology 23:101-107.
	Minami et al., 1996, J. Biol. Chem. 271:19617-19624.
	Nieland et al., 1996, Proc. Natl. Acad. Sci. USA 93:6135-6139.
	Zhu et al., 1996, Science 272:1606-1614.
	Bauer et al., 1995, Scand. J. Immunol. 42:317-323.
	Blachere and Srivastava, 1995, Seminars in Cancer Biology 6:349-355.
	Edginton, 1995, Bio/Technol. 13:1442-1444.
	Greene et al., 1995, J. Biol. Chem. 270:2967-2978.
	Hohfeld et al., 1995, Cell 83:589-598.
	Lowrie et al., 1995, J. Cell. Biochem, Suppl. 0(19b):220.
	McCarty et al., 1995, J. Mol. Biol. 249:126-137.
	Multhoff et al., 1995, Int. J. Cancer 61:272-279.
	Zhu et al., 1995, Scand. J. Immunol. 42:557-563.
	Whitesell, et al., 1994, Proc. Natl. Acad. Sci. USA 91:8324-8328.
	Gragerov et al., 1994, J. Mol. Biol. 235:133-135.
	Gragerov et al., 1994, J. Mol. Biol. 235:848-854.

EXAMINER INITIAL		AUTHOR, TITLE, DATE, PERTINENT PAGES, ETC.
		Barrios et al., 1994, Clin. Exp. Immunol. 98:224-228.
		Barrios et al., 1994, Clin. Exp. Immunol. 98:229-233.
		Del Guidice, 1994, Experientia 50:1061-1066.
		Lowrie et al., 1994, Vaccine 12:1537-1540.
		Nygren et al., 1994, Trends Biotechnol. 12(5):184-188.
		Retzlaff et al., 1994, Infect. Immun. 62:5689-5693.
		Schmid et al., 1994, Science 263:971-973.
		Sato et al., 1994, Proc. Annu. Meet. Am. Assoc. Cancer Res. 35:A2959.
		Silva and Lowrie, 1994, Immunology 82:244-248.
		Srivastava, 1994, Experientia 50:1054-1060.
		Srivastava and Udono, 1994, Current Opinion in Immunology 6:728-732.
		Blond-Elguindi et al., 1993, Cell 75: 717-728.
		DeNagel and Pierce et al., 1993, Critical Reviews in Immunology 13:71:81.
		Lukacs et al., 1993, J. Exp. Med. 178:343-348.
		Mustafa et al., 1993, Infection and Immunity 61:5294-5301.
		Palleros et al., 1993, Nature 365:664-666.
		Perraut, 1993, Clin. Exp. Immunol. 93:382-386.
		Srivastava, 1993, Adv. Cancer Res. 62:153-177.
		Yamamoto et al., 1993, Infection and Immunity 61:2154-2161.
		Nadeau et al., 1992, J. Biol. Chem. 268:1479-1487.
		Nadeau et al., 1992, Protein Science 1:970-979.
		Barrios et al., 1992, Euro. J. Immunol. 22:1365-1372.
		Davidoff et al., 1992, Proc. Natl. Acad. Sci. USA 89:3439-3442.
		Pidoux et al., 1992, EMBO J. 11:1583-1591.
		Lussow et al., 1991, J. Eur. Immunol. 21:2297-2302.
		Srivastava and Maki, 1991, Current Topics in Microbiology and Immunology 167:109-123.
		Flynn et al., 1989, Science 245:385-390.
		Pelham 1988, EMBO J. 7:913-918.
		Munro and Pelham, 1987, Cell, 480:899-907.
		Srivastava et al., 1986, Proc. Natl. Acad. Sci. USA 83:3407-3411.
		Ullrich et al., Proc. 1986, Natl. Acad. Sci. USA 83:3121-3125.
		Von Heijne, 1985, J. Mol. Biol. 184:99-105.

EXAMINER INITIAL		AUTHOR, TITLE, DATE, PERTINENT PAGES, ETC.
		Suzue, K. et al., 1996, J. Immunol. 156:873-9.
		Jindal, S., 1996, Trends Biotechnol. 14:17-20.
		Arnold, D. et al., 1995, J. Exp. Med. 182:885-9.
		Suto, R. et al., 1995, Science 269:1585-7.
		Gething, M.-J. et al., 1995, Cold Spring Harb. Symp. Quant. Biol. 60:417-28.
		Tarpey, I. et al., 1994, Immunology 81:222-7.
		Udono, H. et al., 1994, Science 91:3077-81.
		Li, Z. et al., 1993, EMBO J. 12:3143-51.
		Udono, H. et al., 1993, J. Exp. Med. 178:1391-6.
		Moroi, Y., 2000, Proc Natl Acad Sci U S A 2000 Mar 28;97(7):3485-90
		Melnick, J., 1992, Journal of Biochemistry 267:21303-21306
		Dillman et al., 1995, J. Cell. Biochem., Suppl. 19B, p. 190
		Plumier et al., 1995, J. Clin. Invest. 95 (4), pp. 1854-1860
		Little, et al., 1994, Critical Reviews in Eukaryotic Gene Expression, 1994 4(1) p.1-18
		Porgador et al., 1994 Nat. Immun. 13:113-130
		Jaattela, 1995, Int. J. Cancer, 60 (5), pp. 689-693
		Udono et al., 1994, J. Immun. 152, pp.5398-5403
		Pardoll. 1993, Current Opinion in Immunology, 5:719-725
		Mastrangelo et al., 1996, Seminars in Oncology, 23:4-21
		Lukacs et al., 1994, Cancer Gene Therapy, 1:217

Examiner	<i>Nm Sh</i>	Date Considered	<i>4/16/06</i>
<p>EXAMINER: Initial if citation considered, whether or not citation is in conformance with M.P.E.P. 609; draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.</p>			

<b>LIST OF REFERENCES CITED BY APPLICANT</b> (Use several sheets if necessary)	ATTY. DOCKET NO. 8449-429-999	APPLICATION NO. 10/053,520
	APPLICANT Rothman et al.	
	FILING DATE January 17, 2002	ART UNIT 1646



### U.S. PATENT DOCUMENTS

*EXAMINER INITIAL		DOCUMENT NUMBER	DATE	NAME	PAGES, COLUMNS, LINES, WHERE RELEVANT PASSAGES OR RELEVANT FIGURES APPEAR
N	A01	5,498,538	3/12/1996	Kay et al.	
	A02	5,962,262	10/5/1999	Hillman et al.	
	A03	6,127,393	10/3/2000	Fernandex-Pol	
	A04	6,663,868	12/16/2003	Rothman et al.	

### FOREIGN PATENT DOCUMENTS

		FOREIGN PATENT DOCUMENT COUNTRY CODE, NUMBER, KIND CODE (IF KNOWN)	DATE	NAME	PAGES, COLUMNS, LINES, WHERE RELEVANT PASSAGES OR RELEVANT FIGURES APPEAR
ju	B01	WO 97/06821	2/27/1997	Rothman et al.	
N	B02	WO 99/42121	8/26/1999	Podack et al.	

### NON PATENT LITERATURE DOCUMENTS

Examiner Initials		(Include name of the author (in CAPITAL LETTERS), Title, Date, Pertinent Pages, Etc.)
N	C01	ANDERSON, "Human gene therapy", Nature <u>392</u> (6679 Suppl):25-30 (1998)
	C02	BLACHERIE et al., "Heat shock protein vaccines against cancer", J. Immunother. <u>14</u> (4):352-356 (1993)
	C03	CASTELLI et al., "Human heat shock protein 70 peptide complexes specifically activate antimelanoma T cells", Cancer Res. <u>61</u> (1):222-227 (2001)
	C04	CHEN et al., "Enhancement of DNA vaccine potency by linkage of antigen gene to an HSP70 gene", Cancer Res. <u>60</u> (4):1035-1042 (2000)
	C05	FEDOSEYEVA et al., "CD4+ T cell responses to self- and mutated p53 determinants during tumorigenesis in mice", J. Immunol. <u>164</u> (11):5641-5651 (2001)
	C06	FLAJNIK et al., "Which came first, MHC Class I or Class II?", Immunogenetics <u>33</u> :295-300 (1991)
	C07	HEIKE et al., "Heat shock protein-peptide complexes for use in vaccines", J. Leukoc. Biol. <u>60</u> (2):153-158 (1996)
	C08	HEIKEMA et al., "Generation of heat shock protein-based vaccines by intracellular loading of gp96 with antigenic peptides", Immunol. Lett. <u>57</u> (1-3):69-74 (1997)
	C09	HINDS et al., "Immunological evidence for the association of p53 with a heat shock protein, hsc70, in p53-plus-ras-transformed cell lines", Mol Cell Biol. <u>7</u> (8):2863-2869 (1987)
	C10	HUANG et al., "In Vivo Cytotoxic T Lymphocytes Elicitation by Mycobacterial Heat Shock Protein 70 Fusion Proteins Maps to a Discrete Domain and Is CD4.sup.30 T Cell Independent", J. Exp. Med. <u>191</u> :403-408 (2000)

EXAMINER N. hu	DATE CONSIDERED 4/17/06
*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	

LIST OF REFERENCES CITED BY APPLICANT (Use several sheets if necessary)	ATTY. DOCKET NO. 8449-429-999	APPLICATION NO. 10/053,520
	APPLICANT Rothman et al.	
	FILING DATE January 17, 2002	ART UNIT 1646

## NON PATENT LITERATURE DOCUMENTS

Examiner Initials		(Include name of the author (in CAPITAL LETTERS), Title, Date, Pertinent Pages, Etc.)
ph	C11	KONEN-WAISMAN et al., "Self heat-shock protein (hsp60) peptide serves in a conjugate vaccine against a lethal pneumococcal infection", J. Infect. Dis. <u>179</u> (2):403-413 (1999)
	C12	LEWIS et al., "Pilot study of vaccination with autologous tumor-derived gp96 heat shock protein-peptide complex(HSPPC-96) in patients with resected pancreatic adenocarcinoma", Meeting Abstract, Proceedings of the Annual Meeting of the American Society of Clinical Oncology, <u>18</u> :A1687 (1999)
	C13	LOPEZ-GUERRERO et al., "Modulation of adjuvant arthritis in Lewis rats by recombinant vaccinia virus expressing the human 60-kilodalton heat shock protein", Infect. Immun. <u>61</u> (10):4225-4231 (1993)
	C14	LOVETT et al., "Rubella virus-specific cytotoxic T-lymphocyte responses: identification of the capsid as a target of major histocompatibility complex class I-restricted lysis and definition of two epitopes", J. Virol. <u>67</u> (10):5849-5858 (1993)
	C15	MELCHER et al., "Tumor Immunogenicity is Determined by the Mechanism of Cell Death Via Induction of Heat Shock Protein Expression", Nature Medicine <u>4</u> :581-587 (1998)
	C16	MENG et al., "Tumor suppressor gene as targets for cancer therapy", in: <u>Gene Therapy of Cancer</u> , Lattime and Gerson, Eds., Academic Press, Chap. 1, pp. 3-20 (1999)
	C17	NGO et al., "Computational Complexity Protein Structure Prediction and the Levinthal Paradox", Birkhauser Boston, vol. 14, pp. 491-495 (1994)
	C18	NILSSON et al., "Fusion proteins in biotechnology and structural biology", Curr. Opin. Struct. Biol. <u>2</u> :569-575 (1992)
	C19	RIDDELL et al., "T-cell mediated rejection of gene-modified HIV-specific cytotoxic T lymphocytes in HIV-infected patients", Nature Medicine <u>2</u> :216-223 (1996)
	C20	SRIVASTAVA and UDONO, "Heat shock protein-peptide complexes in cancer immunotherapy", Curr. Opin. Immunol. <u>6</u> (5):728-732 (1994)
	C21	SUZUKI et al., "Regulating the retention of T-cell receptor alpha chain variants within the endoplasmic reticulum: Ca(2+)-dependent association with BiP", J. Cell Biol. <u>114</u> :189-205 (1991)
	C22	THEOBALD et al., "Targeting p53 as a general tumor antigen", Proc. Natl. Acad. Sci. USA <u>92</u> (26):11993-11997 (1995)
	C23	THOMSON et al., "Minimal epitopes expressed in a recombinant polyepitope protein are processed and presented to CD8+ cytotoxic T cells: implications for vaccine design", Proc. Natl. Acad. Sci. USA <u>92</u> (13):5845-5849 (1995)
	C24	THOMSON et al., "Recombinant polyepitope vaccines for the delivery of multiple CD8 cytotoxic T cell epitopes", J. Immunol. <u>157</u> (2):822-6 (1996)
✓	C25	TODRYK et al., "Heat Shock Protein 70 Induced During Tumor Cell Killing Induces Th1 Cytokines and Targets Immature Dendritic Cell Precursors to Enhance Antigen Uptake", J. Immunol. <u>163</u> :1398-1408 (1999)
	C26	VERMA et al., "Gene therapy -- promises, problems and prospects", Nature <u>389</u> (6648):239-242 (1997)

EXAMINER N. M. S. S.	DATE CONSIDERED 7/11/06
*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	

<b>LIST OF REFERENCES CITED BY APPLICANT</b> (Use several sheets if necessary)	<b>ATTY. DOCKET NO.</b> 8449-429-999	<b>APPLICATION NO.</b> 10/053,520
	<b>APPLICANT</b> Rothman et al.	
	<b>FILING DATE</b> January 17, 2002	<b>ART UNIT</b> 1646

### NON PATENT LITERATURE DOCUMENTS

Examiner Initials		(Include name of the author (in CAPITAL LETTERS), Title, Date, Pertinent Pages, Etc.)
<i>mu</i>	C27	WELLS et al., "Hsp72-mediated Augmentation of MHC Class I Surface Expression and Endogenous Antigen Presentation", Int. Immunol. <u>10</u> :609-617 (1998)
<i>J</i>	C28	YAMAZAKI et al., "Cutting Edge: Tumor Secreted Heat Shock-Fusion Protein Elicits CD8 Cells for Rejection", J. Immunol. <u>163</u> :5178-5182 (1999)
<i>J</i>	C29	SRIVASTAVA, "Interaction of Heat Shock Proteins with Peptides and Antigen Presenting Cells: Chaperoning of the Innate and Adaptive Immune Response", Ann. Rev. Immunol. <u>20</u> :395-425 (2002) (E. Pub. October 4, 2001).

<b>EXAMINER</b> <i>Nurt / ~</i>	<b>DATE CONSIDERED</b> <i>4/17/06</i>
*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	